

HILLMAN BARGE AND CONSTRUCTION COMPANY
Paul Thomas Boulevard
Brownsville
Fayette County
Pennsylvania

HAER NO. PA-219

HAER
PA
26-BROVI,
3-

PHOTOGRAPHS

WRITTEN HISTORICAL AND DESCRIPTIVE DATA

REDUCED COPIES OF MEASURED DRAWINGS

Historic American Engineering Record
National Park Service
Department of the Interior
P. O. Box 37127
Washington, D.C. 20013-7127

HISTORIC AMERICAN ENGINEERING RECORD
HILLMAN BARGE AND CONSTRUCTION COMPANY
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Location: Along the Monongahela River, near the 57-mile marker in Brownsville, Fayette County, Pennsylvania

Construction Date: 1886-1903; 1903-1918; and 1918-1970s

Builders: Samuel S. and W. Harry Brown; Pittsburgh Steel Company; and J.H. Hillman & Sons Company

Present Owners: Trinity Industries Incorporated

Present Use: Barge Fabrication

Significance: The Hillman Barge facility is significant in the commercial and industrial development of southwestern Pennsylvania as a fabricator of shipping vessels. Beginning as a distribution facility for cotton, grains, coal and other goods, the site developed into a barge and boat manufacturing venture integral to the coal and coke trade vital to the region's iron and steel industry. Innovative production procedures, from welding technologies to assembly line construction, led to the emergence of large steel barges capable of supplying raw materials to the mills in Pittsburgh.

Historian: Kathy Hopkins, 1992

The site of the Hillman Barge and Construction Company in Brownsville, Pennsylvania has long been associated with the commercial development of southwestern Pennsylvania. During the nineteenth century, the Monongahela River in southwestern Pennsylvania functioned as a primary commercial link between the region and other parts of the United States. Cotton, for example, was transported by keelboat from the Mississippi River delta to Pittsburgh, Pennsylvania, and then into the Monongahela Valley. In return, grains, sand, gravel, coal, and coke traveled down the Monongahela to Pittsburgh and then to New Orleans. Boat-building became an essential craft in western Pennsylvania to support this commercial link, and future industrial development.

In 1858, William Huley Brown, a Pittsburgh industrialist who founded the commercial venture W. H. Brown & Sons, was one of the first to exploit the commercial link by lashing twelve keelboats to a steamboat and hauling them to New Orleans. After W. H. Brown's death in 1875, his sons, Samuel S. and W. Harry Brown, continued and expanded the family business.¹

On March 11, 1886, the Brown brothers purchased John Russell Thorton's mining and shipping operation, located at the 57-mile point on the Monongahela River near Brownsville, Pennsylvania. The property was divided between the two brothers, with W. Harry managing the Alicia Mine and Samuel operating the dock and distribution center. Between 1886 and 1903 two brick warehouses were constructed by Samuel to store cotton, grain, coke, and coal. The site commanded a strategic position in the area, and soon developed a vigorous commercial and social life.²

In 1903, the property was subdivided and sold to various companies including the Pittsburgh Steel Company, the Monongahela Railroad Company, and the Hecla Coal and Coke Company. The

¹ Alexander Rook, ed., Western Pennsylvanians (Pittsburgh: Western Pennsylvania Biographical Association, 1923), 392, 492. See also Heritage Collection Parium, History of Allegheny County Pennsylvania, 1889, Vol. 2, (Pittsburgh: Unigraph History and Biography, 1977), 226-7.

² Fayette County, Record Deed Books, Vols. 67 and 213, (Uniontown, Pennsylvania: Fayette County), pages 94 and 108, respectively; Correspondence between W. Harry Brown, Alicia Mines, Connellsville Coke, Brownsville, Pennsylvania, and G. B. Obey, Superintendent of the Monongahela Railroad Company, Brownsville, November 6, 1913.

Pittsburgh Steel Company purchased Samuel's warehouse and dock, and constructed a marine ways (for launching and retrieving vessels) and two steel buildings. In 1918, John H. Hillman purchased the facility for his transportation company and barge construction and repair shop. For the past century, the warehouses, dock, and other facilities have been integral to the distribution and transportation of goods throughout the region.³

The Evolution and Expansion of the Hillman Holdings

In the early twentieth century, John Hartwell Hillman established himself as a major player in the mining and distribution of coal and coke along the Monongahela and Ohio rivers. By the time of his death in 1959, Hillman was sole proprietor of J.H. Hillman & Sons Company, Hillman Transportation Company, and Hillman Barge and Construction Company; chairman of the board for Pittsburgh Coke and Chemical Company, Grant Building Inc., and Texas Gas Transmission Corporation; a director of Pittsburgh Steel Company, Pittsburgh National Bank, and the Neville Island Company; and former majority shareholder in the Emerald Coal and Coke, Hecla, Monessen, and Alicia Mines.⁴

Hillman's wealth was founded on coal and coke, and grew through his ability to expand into new markets. Born in Kentucky in 1887, he made his way to Pittsburgh and established himself as a coal, coke, and pig iron broker in western Pennsylvania by the age of eighteen. By the age of twenty-one, Hillman had purchased several older mines, eventually founding the J.H. Hillman and Sons Company in 1913. By the mid-1920s, this company operated as many as fifteen mines in the region. As the coal in his older mines was being depleted he began to expand into related industries. In 1918 Hillman incorporated Hillman Transportation Company and Dravosburg Dock and Construction Company. While Hillman always had a partner in his previous ventures, he was the sole proprietor of both the Transportation and Dravosburg Dock companies. By expanding into transportation ventures, Hillman was able to vertically integrate his extractive holdings with shipping industries. Hillman-mined coal and coke were transported to buyers on Hillman-owned barges. These barges were

³ Robert B. Van Atta, "Brown First To Send Coal On The Mon," Greensburg Tribune September 10, 1989; Fayette County, Record Deed Books, Vol. 213, p. 108; Vol. 550, p. 290; Vol. 558, p. 32; Vol. 714, p. 487; Vol. 956, p. 541; Vol. 912, p. 559; and Vol. 1151, p. 679; Anthony E. Pizzuto, "Hillman: Big Barge Builder," West Penn Power Company Newsletter, July-August 1963.

⁴ "Industrialist J.H. Hillman Dies," Brownsville Telegraph, Vol. 44, #155, 1959, 1.

purchased, not built, by the Hillman Transportation Company, but the Dravosburg Dock and Construction Company was in fact a small machine shop capable of vessel repairs.⁵

The Birth of Barge Facilities and Production in Brownsville

Although the Hillman Transportation Company flourished during the 1920s, its assets were severely reduced during the Great Depression. As a result, Dravosburg Dock and Construction Company was shut down in 1929. In 1932, however, Hillman decided to establish a new vessel construction and repair shop in Brownsville on the site of the Brown brothers' property he had purchased in 1918. This property included the old marine ways built by the Pittsburgh Steel Company after 1903.⁶

The new facility began operations under the supervision of two of Hillman's former Dravosburg employees, Captain John Howder and Frank Silliman. Previously, Captain Howder was a river boat captain with the Hillman Transportation Company. During his tenure with the Transportation Company, Captain Howder exhibited a keen understanding of both the local river system and company business. His extensive knowledge of clients and competitors gained the respect of Hillman.

Frank Silliman began as a welder at the Dravosburg Dock and Construction Company. His welding skills, his motivational skills, and his ability to keep the transportation company's vessels afloat caught the attention of Hillman. Consequently, Silliman was transferred to the Transportation Company and continued to repair vessels when the repair company was deactivated. His welding and vessel design knowledge enhanced the manufacturing and production innovations at the Hillman Barge facility, and by 1938, Silliman had become the superintendent of the shop.

By 1933, a small crew of four welders, two crane operators, two carpenters, and a laborer were repairing vessels at the

⁵ "Industrialist J.H. Hillman Dies."

⁶ Sandra Pyle, Corporate Historian for J.H. Hillman & Sons Company, interview with author, 1992. Edward Sykes, "Welds Replace Rivets on Barges in Pittsburgh District," The Welding Engineer 21 (March 1936), 23. See also, Department of the Interior, National Park Service, Historic American Engineering Record, Fayette County, Pennsylvania: An Inventory of Historic Engineering and Industrial Sites, by Sarah Heald, (Washington, D.C., 1990), 132-3.

Brownsville site for the Hillman Transportation Company. As the barge facility grew and coal in the area's mines diminished, several of the general laborers and welders from Hillman-owned mines were transferred to the barge facilities. In 1938, the facility contained a carpentry and machine shop, capable of repairing barges, towboats, and steamboats. Construction of barges became more of a priority in 1939, as the Hillman Transportation Company successfully marketed its barges in various coal mining regions. The Brownsville facility was renamed the Hillman Barge and Construction Company. In 1941, Captain Howder was appointed president of the Barge Company, a position he held until 1951.⁷

As Hillman's mine holdings continued to be depleted between 1944 and 1953, his corporate resources were shifted into the transportation and barge facilities in anticipation of a further stagnation in the coal industry. Hillman's coal and coke, and transportation companies nurtured the fledgling barge company by providing land and facilities at the Brownsville site at reduced rent, as well as the necessary employees for barge construction and repair. More importantly, the coal and coke, and transportation companies required a steady stream of vessels to be built and repaired during the early years of the barge company's operation. In addition, the barge company offered an efficient site for vessel reconstruction, thereby enabling Hillman's salvaging operations to increase, and his transportation fleet to multiply.⁸ Regional competitors of Hillman's barge facilities at the time included the Dravo Contracting Company, the American Bridge Company, and Jones and Laughlin Steel Corporation.⁹

⁷ Hillman Barge and Construction Company, Seniority List, August 31, 1974; Sandra Pyle, Corporate Historian of the J.H. Hillman & Sons Company, interview with author, 1992. Hillman Barge and Construction Company personnel records reveal that miners were hired from Emerald Coal and Coke Company, Alicia Coke Ovens, Monessen Coal and Coke Company, and Hillman Coal and Coke Company. John H. Hillman had some affiliation with each of these companies.

⁸ It was quite common for one company to salvage another company's abandoned vessels, repair them, and incorporate the vessels into their own fleet.

⁹ "Bids for 39 Barges Received," Marine Engineering (April 1928): 236.

PROCESS AND PRODUCTION CHANGES

Wooden and Steel Construction

Changes in vessel design and construction, larger locks, and improved dams transformed the river transportation industry. Throughout the nineteenth century, traders and commercial ventures in the Monongahela River Valley employed various styles of wooden keelboats to transport goods. Although many companies, like Samuel and W. Harry Brown's, used wooden keelboats, with the development of the regional steel industry, new applications for steel, including boat-building, were developed. The caulked seams of wooden vessels, and riveted seams of metal vessels, were likely to leak under severe weather conditions or as a result of bumping, resulting in damage to cargoes. The innovation of welded steel construction provided for stronger and longer lasting seams which could withstand heavier loads.

Manufacturers converted production from wooden keelboats and barges with a maximum length of 100', to welded steel barges slightly over 200' in length.¹⁰ Early, steel-made barges resembled wooden keelboats with steep steel sides and flat wooden decks. New materials, construction methods, and an increase in size substantially enlarged the hauling capacity of barges. The 200' barges, in particular, became vital to the increased flow of coal, coke, and steel in the Monongahela Valley. Hillman's Kennedy design provides an example of the gradual trend toward welded vessel construction.

Kennedy Barge Fabrication during World War II

World War II had a substantial effect on the development of welding technology in the United States. The need for increases in military vessel production led to a marked dissemination and heightened quality in commercial welding technology after the war. In 1959, the third edition of the Welding Handbook published by the American Welding Society, remarked on the role of the war in expediting welding as a viable production technique. For boat-building, the book notes that welding led to a 5% to 15% savings in hull weight, and a 25% reduction in maintenance compared to riveted ships.¹¹

¹⁰ Due to lock and dam size restrictions, barges on the Mississippi and Ohio Rivers averaged 195 to 220 feet in length, while barges on the Monongahela and Allegheny Rivers averaged 175 feet in length.

¹¹ Welding Handbook, 3rd. ed., (New York: American Welding Society, 1950), 1195.

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The scarcity of plate steel during the war years had a negative effect on the domestic transportation industry. Many design and production changes had to be developed, due to the unavailability of A-36 steel used in barge construction.¹² The Kennedy barge model was the primary design fabricated at the Hillman company between 1938 and 1942. The construction process involved welding several prefabricated narrow vertical strips of A-36 steel for each barge section. Cutting, forming, and bending prefabricated units occurred off site at Hunter Steel Company of Neville Island until 1942.

Prefabricated modules from Hunter Steel were shipped to the Alicia marine ways on the transportation company's barges, where a welding crew from Hillman Barge and Construction assembled the modules into a barge. The barge fabrication crew typically included four welders, two fitters, two crane operators, a supervisor, and a foreman.¹³

The production of Kennedy barges at Hillman Barge company employed batch fabrication methods, in which a single barge was fabricated at one location from start to finish. Between 1938 and 1944, the fabrication of a Kennedy barge began from the inner bottom and side modules, outward to the bottom and sides of the hull. The plates and units arrived by barge and were stored in the yard near the marine ways. A crane operator moved plates and units from the shipping barges and storage areas to the fabrication site on the marine ways.

Between 1938 and 1942, it took approximately one and one-half months to complete a prefabricated Kennedy barge. However, most of the work at the marine ways was in vessel repair, and not vessel fabrication. In 1943, the availability of steel plate

¹² A-36 steel has been identified as follows by the American Welding Society in its section on ships: "The latest American Bureau of Shipping specifications for hull steel published in 1948 recognizes variations in notched toughness due to thickness by specifying plates into three classes. The mechanical properties of all three classes are as follows: 59,000-70,000 psi., minimum yield strength 32,000 psi.; minimum elongation in 8 in., 1,500,000/TS or 22% in 2 inches. Open-hearth or electric furnace is specified for all three classes. Class "A" includes plates up to and including 1/2 inch thick and all shapes. The tensile strength limits insure a medium carbon steel." Welding Handbook, 1196-7.

¹³ Other workers, such as carpenters and blacksmiths, were employed by Hillman Transportation Company, but later hired by Hillman Barge and Construction Company.

increased, allowing for a new barge design that was an adaptation of the Kennedy and standard designs. This new design included single channel side frames with hopper insets in the gunwale similar to the old Kennedy design. The side rake deck, however, was increased to 12.5', and the seam welding utilized casted rivet bit caps.¹⁴

Postwar Standard Design Barge Fabrication

The renewed availability of steel for manufacturing at the end of World War II was marked by the return of traditional barge design, and the introduction of new welding methods. Acetylene torches replaced electrode welding and introduced not only new techniques in plate cutting and welding, but also new equipment for plate bending and forming.¹⁵ The first standard barge fabricated on the Alicia marine ways was the H-Type, twenty of which were built between March 1944 and April 1945.

The H-Type design was similar to the Kennedy design and consisted of a wooden deck, single channel side frames, and a hopper inset in the gunwale.¹⁶ The radius of the H-Type barge was 6.75", while the rake deck was 12.5' long.¹⁷ The single channel side frames had a spacing of 2' and the gunwale, at approximately 1.75" wide gave little slope to the side hopper. The entire barge

¹⁴ Engineering drawings of standard size barges fabricated by Hunter Steel Company for Pittsburgh Coke and Iron Company, "Hopper Barge 175' x 36' x 11' General Arrangement Kennedy Type," March 4, 1943. Leonard Flick, retired supervisor of HBC Barge, Brownsville, interview with author on August 20, 1992. See also, records on Hillman Standard Hopper Barges 175' x 26' x 11', Hillman Barge and Construction Company internal document, revised November 17, 1977.

¹⁵ Hillman Transportation Company leased the property from Hillman Coal and Coke from 1917 to 1943. (Personal communication from Sandra Pyle, Corporate Historian of the J.H. Hillman & Sons Company; and Uniontown, Fayette County, Pennsylvania, Record Deed Book, Vol. 588, p. 321.)

¹⁶ The gunwale (also called gun'l or gunnel) is the junction of the deck and the side of a vessel.

¹⁷ The bilge is the curved section between the sides and bottom of the vessel's hull. It is an internal section into which the vessel's water drains.

was fabricated with casted caps.¹⁸

Ten HA-Type wooden deck barges were constructed between April 1945 and September 1951. The general HA-Type Hillman barge was comprised of a 175' x 26' x 11' wooden deck with standard A-frame sides and a hopper sloping from 30" at the gunwale to 39" at the base line. Rakes for this type were built with 2' x 1-1/4" frame spacing, cast steel bits, and three 4" flat bars on the rake corners. Side modules were constructed with a 9" "C" splash channel, 6" x 4" angles on the side framing, and a 5" x 3.5" angle hopper framing. The headlong typically measured 5/8".¹⁹

The greater availability of steel, improved welding techniques, and a growing market necessitated a larger, and more coordinated production space. Between 1940-1948, the Hillman Barge and Construction Company completed the first major expansion of its facilities. The number of employees grew steadily from an average of twenty in 1940, to fifty in 1945, and over 150 by 1950.²⁰ Between 1938 and 1944, barges were only constructed in the yard and on the marine ways. In 1940, as part of Howder's expansion plan, Frank Silliman and Wiley L. Byers, Jr. worked together to develop a series of production flow patterns to facilitate the process of barge fabrication.

Both internal and external facilities were utilized in the new production method. Rakes were fabricated both in the yard and in the steel buildings, while bottoms were constructed on the marine ways. Most materials were stored in the company yard. The yard, building, and marine ways were spatially organized to facilitate what company employees refer to as, "localized process flow." This method replaced the former batch process and expedited the fabrication of barges through a coordination of material movement in the facility, greatly expanding the company's physical plant and business operations.

Towboats and Expanded Barge Facilities

It was Hillman's desire to employ the industry's foremost architectural designer to construct a unique and distinctive

¹⁸ Hillman Barge and Construction Company, "Standard Hopper Barges," revised November 17, 1977. (This list contains standard barge developments by type, hull number, drawing number, deck style, year of fabrication, and description from 1944 to 1977.)

¹⁹ "Standard Hopper Barges."

²⁰ Hillman Barge and Construction Company records, Brownsville, Pennsylvania.

design for his towboats that would set them apart from others already on the drawing board. By 1945, Hillman solicited Elmer L. Easter of the Dravo Corporation to become his engineer and architectural designer. Once in production, Easter's designs distinguished Hillman towboats from all others on the river. In the M.V. JAMES ZUBIC, for instance, Easter designed uniquely-detailed chamber decks, curved plating in housing, S-shaped contours to the roof and hull lines, and midship engines.

Compared to traditional towboats, these elaborate features substantially added to the design, labor, and material cost of production. The ZUBIC took nearly a year to complete. Easter's test designs in unique curves and contours in the steel hull required cutting and fabrication techniques that only blacksmiths could supply. The high cost of the smiths, and the continual reworking of the cutters insured that the ZUBIC would be the first, and only boat which utilized blacksmiths. In his next vessel, Silliman replaced the smiths with acetylene torch cutters and welders.²¹ Silliman had the steel plates that Easter designed copied into wooden patterns. The patterns were constructed by carpenters and designed as templates for the acetylene torch cutters and welders of the second boat. Although this new method was laborious, it reduced construction time to slightly over six months per vessel.

Because acetylene torch plate cutting was expensive and time consuming, Silliman quickly justified purchasing a semi-automated torch cutting table.²² Little information exists from either the company or the union regarding the workers' attitudes toward this machine which required two to four operators. The number of burners necessary for towboat fabrication was reduced, and the classification of burner does not appear on any company records after 1955.

Despite cost and production problems, new towboat design continued. Today, many of these boats are still operating on the Monongahela River. As evident in the M.V. SOLVAY (1947), Easter's engineering and architectural innovations in towboat design set Hillman's boats apart from traditional styles.²³

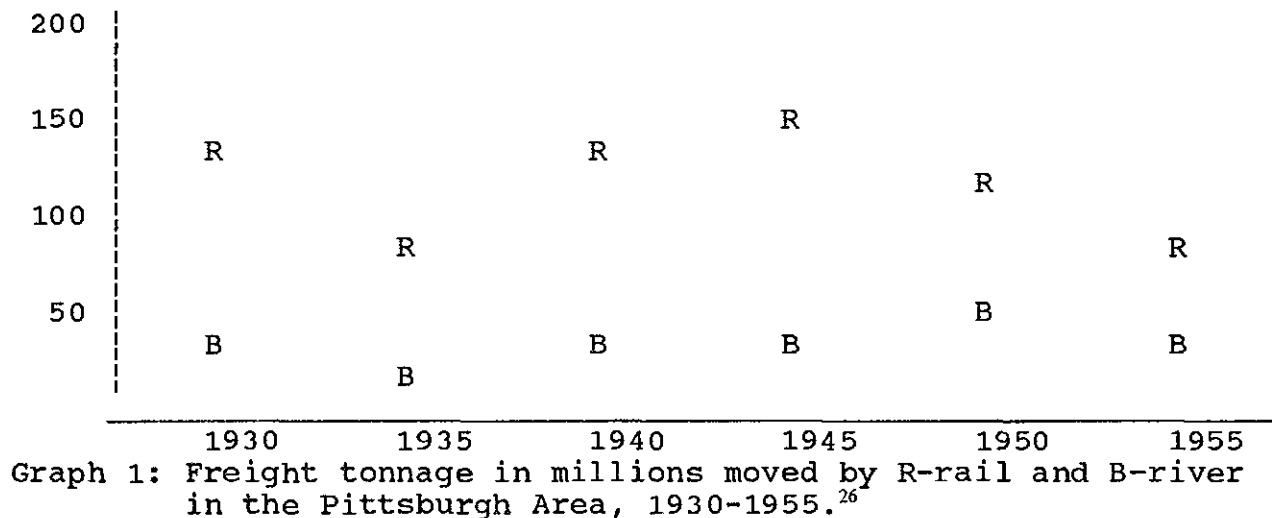
²¹ Cutters were welders which used acetylene torches to cut the fashioned steel.

²² R.D. Simonson, The History of Welding, (Monticello Books, 1969), 145.

²³ Hillman Barge and Construction Company, "Twin Screw Diesel Boat," drawing number 4513-A. This drawing was used for the following towboats: M.V. SOLVAY, M.V. LABELLE, and the M.V.

Contemporary trade journals such as The Waterways Journal, noted that, "The Solvay was one of the standard towboats developed by her builders, and is a distinct departure from previous industry designs and methods. She is in the 1000-hp class and is 145 feet long with a propulsion power supplied by 2-cycle, 6-cylinder General Motors Model 6-278A Siedel engines with airflex clutch-reverse-reduction-gear units."²⁴ Hillman Barge marketed these towboats to local and national companies.

By 1958, towboats hauled an average of forty to eighty thousand tons per day along the Monongahela River within Washington County alone, and there were more than 100 river terminals in Allegheny County. The increased volume of river commerce in the Pittsburgh region continued to include coal, sand, gravel, iron and steel products. The slow speed of river transportation was usually offset by its reduced cost, enabling it to remain competitive. The national income of the transportation industry grew from \$4.6 billion in 1939, to \$16.4 billion in 1958, reflecting the increased demand experienced by many barge companies.²⁵



ONWARD. Richard Basci, Chief Engineer of HBC Barge, interview with author, June 30, 1992, and August 20, 1992.

²⁴ "Hillman Completes General-Motors-Powered Streamlined Towboat Solvay," The Waterways Journal 61 (August 23, 1947), 7-8. See also, "The Solvay," Diesel Times (August 1947).

²⁵ Ibid.

²⁶ Ira S. Lowry, Portrait of a Region (Pittsburgh: University of Pittsburgh Press, 1963), 79-88.

Equipment and Facility Expansion

According to the 1958 United States Census of Manufacturers, expenditures for new plants and equipment for established facilities increased nationally from \$5 million in 1950, to \$11.4 million in 1957. The bulk of these expenditures were dedicated to machinery and equipment, an increase of over \$4 million between 1950 and 1957. The shipbuilding and repair industry expended a total of \$54 million, with \$27.4 million for new structures and \$26.5 million for new machinery and equipment.²⁷

Locally, Hillman Barge experienced a significant increase in the number of vessels produced. In 1953, for instance, the company fabricated ten towboats and 100 barges, and increased its workforce to 215 employees. Between 1951 and 1953, burners were replaced with automated machines, additional floor space was created, and a series of additional internal flow patterns began to appear. Part of the new process was the movement of the old foundry and machine shop to the barge fabrication facility.

The wooden building continued to house the offices. Electrode welding, shears, lathes, break presses, and other pieces of equipment were positioned in or near the fabrication shops to enhance the flow of towboat and barge production. Therefore, by the end of Howder's tenure, additional equipment and fabrication space was needed. Pattern storage was moved to the second floor of Warehouse "B," and was renamed the mold loft. Within the mold loft, head draftsmen Fred Shedal and his assistant Steve Yanek constructed all patterns for the vessels. Their wooden templates and layouts were later made from red paper and cardboard.²⁸

Between 1950 and 1959, an extensive overhead crane system was constructed throughout the facility. Although the shop yard was still the primary site of barge fabrication, production also took place at the marine ways, the skid ways, Shop 1 and 2, a frame office building, and a saw mill (the skid ways is an additional launching site, where vessels were primed, put in the

²⁷ Luther H. Lodges, United States Census of Manufactures: 1958, Vol. I, Summary Statistics for Industries and Geographic Areas (1961), 5-3.

²⁸ HBC Barge defines a mold loft as, "A building with a large smooth floor for laying down the lines of a vessel to actual size to be used for making templates from them for the structural work entering the hull," HBC Barge, Inc., HBC Barge, Inc. Employees Manual, revised August 30, 1988, 21. Abe Petrosky, Head Pattern Maker, HBC Barge, interview with author, July 15, 1992.

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water, checked for leaks, and retrieved by the marine ways). The marine ways, serviced by a forty-ton electric stiffleg crane, was used for vessel dry docking, construction, and repair.²⁹ New barges and towboats were pre-assembled, erected and launched at the barge yard, and on the skid ways.

²⁹ Hillman Barge and Construction Company, "Walkway to Outfitting Dock," engineering drawing number 1028; and "Stiff Leg Crane Foundations," engineering drawing number 993-995.

CRAFTS AND THE UNIONS

The Evolution from Craftsman to Union Brother

As welding technology improved between World War I and World War II, Hillman Barge's manufacturing processes progressed from forged welding, to oxyacetylene methods, electrode stick welding, semi-automated plate cutting, and finally automated welding stations. The new technologies led to a reconfiguration of the production process as burners and forge welders became machine operators and electrode welders. Welders increasingly replaced carpenters as wood vessel modules were replaced by steel modules. During World War I alone, the number of establishments producing steel vessels rose from seventy-nine to one hundred and sixty-two.³⁰ This trend continued through World War II, and included the Hillman Barge and Construction Company, as technological innovation changed the position of labor, and led to the development of unionization.

Between 1942 and 1944, representatives of both the United Mine Workers(UMW) and the United Steel Workers(USW) solicited the employees at Hillman Barge and Construction Company. Both organizations believed they had jurisdiction over Hillman employees: the USW because of the shared technology of barge construction and steel-shaping, and the UMW because many employees were ex-mine workers. Representatives from both unions agreed to work peacefully to solicit new members.³¹

Although national hostility toward unionism was increasing at this time, local sentiment in Brownsville and much of western Pennsylvania remained pro-union.³² In 1944, the USW won the right to represent hourly employees at the Hillman Barge and Construction Company. On September 11, 1944, USW Local 3312 held its first meeting during which it drafted by-laws and elected officials, including president Gene Hone; vice-president Ed Barnes; secretary John "Doc" Dawson Provance; and treasurer Ben Przybyszewski. With a loan of \$50 from the district office in

³⁰ See the Fourteenth Census of the United States, Washington, D.C., 1920.

³¹ "Seniority Roster," May 1, 1975; "Seniority List," August 31, 1974; and "Employee Lists," May 18, 1973, and March 7, 1974, Hillman Barge and Construction Company, Brownsville, Pennsylvania.

³² See Melvyn Dubofsky and Warren Van Tine, John L. Lewis: A Biography, (1986), 323.

Charleroi, Local 3312 established its office.³³

Membership of Local 3312 was composed primarily of welders, fitters, blacksmiths, machinists and pipe fitters. These union workers quickly began to align themselves with their new welding brothers in the steel industry. With the end of World War II, many returning steelworkers boosted the rank-and-file of the USW, and the union worked to reestablish its strength and bargaining power in the region.³⁴

In 1948, several welding craftsmen led the first contract strike. It was the union's attempt to better position itself with a contract patterned after the Basic Steel Agreements.³⁵ Pension and insurance agreements were established between 1950 and 1962. During this period, the Hillman company's pension plan normally lagged one to two contracts behind the Basic Steel Pension Agreements. The first such agreement, which mandated that employees contribute approximately half the insurance premium's cost, began on March 1, 1950. A cost of living adjustment was not agreed upon until 1957.

Tough times lay ahead for the Brownsville barge worker just as they did for the Pittsburgh steelworker in the 1960s and 1970s. In Pittsburgh, the USW lost its cost of living allocation (COLA) in 1960, resulting in a 3.5 percent loss in workers' weekly earnings over the next eight years.³⁶ Although USW members in Brownsville found their COLA provision eliminated in 1960, Local 3312 had existing COLA adjustments added to base pay rates, thus minimizing their loss.

The 1960s were a volatile decade for Local 3312, with strikes in both 1963 and 1966, in an effort to reactivate previous agreements. While these efforts were unsuccessful, the second half of the 1960s was marked by attempts to negotiate

³³ Information supplied through HBC Company records. The material was recorded by James Hatfield, Vice President of Human Resources, Hillman Barge and Construction Company. Also, USW Local 3312, "Meeting Minutes," 1944-1950.

³⁴ John P. Hoerr, And The Wolf Finally Came: The Decline of the American Steel Industry, (Pittsburgh: University of Pittsburgh Press, 1988), 101.

³⁵ Ibid.

³⁶ Hoerr, 110.

safety and wage agreements.³⁷ Under the leadership of union representatives Donald Redman and Andrew Bury, an agreement was reached on August 29, 1968, and a three year contract was signed by the union rank-and-file.³⁸

The short-lived economic boom of the 1970s was met by the bust of the late eighties. During these difficult times, John Hatfield was Vice President of Personnel for the Barge Company, and Anthony J. Kaydo served as president of Local 3312. Actions taken by Mr. Kaydo and Mr. Hatfield permitted the Company to exchange Company Stock for Union Pension Funds that were reinvested into new production equipment. Although a stiffener, slot welder and 30-ton overhead crane were acquired for the plant with these funds, the market continued to drop. By February 1987, the number of employees was reduced to fifty-eight.³⁹ In 1987, with the hope of avoiding future layoffs, the union signed a contract resulting in a \$1.07 per-hour wage reduction with an additional \$2.40 reduction phased in over the next six years. Furthermore, seven welding jobs were consolidated into four.⁴⁰

In January 1989, the facility was purchased by Trinity Industries Incorporated which continues to fabricate barges and towboats on two production lines and a marine railway. Known as HBC Incorporated, the plant is Brownsville's largest employer, as of 1990, with 209 workers.

John Hager was elected president of Local 3312 in 1990. During the contract negotiations of 1991, the union seriously considered the company's threat of a layoff. The secret ballot vote of 108 to 80 endorsed the contract as presented, without a strike. Although the contract called for medical deductibles to increase from \$300 per family to \$600, and from \$200 per person to \$400, wages were increased six percent that year with an

³⁷ Safety issues included a variety of items, such as the establishment of a union represented safety committee, the purchase and use of cranes, and even the use and purchase of basic protective welding equipment such as gloves, goggles, and leather aprons.

³⁸ Information supplied by Hillman Barge and Construction Company internal paper on "Labor History," written by James Hatfield, Vice President of Human Relations.

³⁹ Robin Action Huhn, "Union Leader Vows To Build For Future," Herald-Standard, April 14, 1989, 11-12.

⁴⁰ Robin Action Huhn, "HBC Barge Employees Approve Wage Cuts," Herald-Standard, May 1, 1987.

additional three percent over the next three years.⁴¹ Despite the contract agreement layoffs still occurred, and by May 1991, only a handful of employees remained.

In 1991, approximately 400 retired employees were affected by poor junk-bond investments by the Executive Life Insurance Company which held over \$6 million of pension funds. With the collapse of the company, the status of pensions were questionable until 1992 when Mutuelle Assurance des Artisanale de France (MAAF), a French investment group, purchased Executive Life. MAAF restored pension payments to their original level and continues to maintain the fund.⁴²

The Hillman Barge and Construction Company has been integral to the commercial and industrial development of southwestern Pennsylvania. The expansion of steelmaking facilities in the Pittsburgh District necessitated the integration of extractive and production functions through a river and rail distribution system capable of transporting raw materials from mine to mill. The development of barge-building technology at Hillman, including innovative welding and production procedures, fostered the use of large, all steel barges capable of supplying the mills with coal, coke, and ore. The decline of the regional steel industry in the 1970s and early 1980s led to the decline of ancillary industries, including boat building, that were linked to the larger industrial system. The future of the barge-building industry in southwestern Pennsylvania remains uncertain.

⁴¹ Jim Smith; "HBC Barge Pact Gets Vote Of Approval"; Herald-Standard, May 5, 1991.

⁴² Jim Smith, "HBC Barge Retirees To Retain Benefits," Herald-Standard, April 28, 1992; "HBC Pensions May Hinge On French Buy-Out Proposal," Herald-Standard, November 18, 1991; and "HBC Retirees Get Good News On Pensions," Herald-Standard, August 8, 1991.